REMARKS

Claims 1-25 were pending in the Application. Claim 1 is an independent claim and claims 2-16 depend there from. Claim 17 is an independent claim and claims 18-23 depend there from. Claim 24 and 25 are independent claims. Applicant respectfully requests reconsideration of the application in light of the following remarks.

Rejections Under 35 U.S.C. §102(e) - Pandya

Claims 1-3, 16 and 17 were rejected under 35 U.S.C. §102(e) as being anticipated by Pandya (U.S. Patent No. 7,376,755). The Applicant respectfully traverses the rejections for at least the following reasons.

With regard to the anticipation rejections, MPEP 2131 states, "[a] claim is anticipated only if each and every element as set forth in the claim is found, either expressly or inherently described, in a single prior art reference." *Verdegaal Bros. v. Union Oil Co. of California*, 814 F.2d 628, 631 2 USPQ2d 1051, 1053 (Fed.Cir. 1987). MPEP 2131 also states, "[t]he identical invention must be shown in as complete detail as is contained in the ... claim." *Richardson v. Suzuki Motor Co.*, 868 F.2d 1226, 1236, 9 USPQ2d 1913, 1920 (Fed. Cir. 1989).

Regarding claims 1 and 17, the Applicants respectfully submit that Pandya fails to teach, suggest, or disclose, for example, "wherein a one-shot initiation process of an RDMA operation is performed between the driver and the NIC of the host," as set forth in independent claim 1; and "wherein a one-shot completion process of an RDMA operation is performed between the driver and the NIC of the host," as set forth in independent claim 17.

With regard to claim 1, the non-final Office Action alleges that Pandya discloses "wherein a one-shot initiation process of an RDMA operation is performed between the driver and the NIC of the host (Fig. 35 that shows a one-shot initiation process of an RDMA operation 3501 + 3510 between the driver and the NIC of a the host (a single command request for iSCI

Read using RDMA Write); and Fig. 37 that shows a corresponding one-shot initiation process of an RDMA operation 3701 (a single command request for iSCI Write using RDMA Read); column 34, lines 19-30 and column 34, lines 1-15 describes the details of the initiation process for read and write operations)." (Non-Final Office Action, Pages 3-4).

However, nothing in Pandya's Figures 35, 37 and the supporting disclosure discuss the initiation process of an RDMA operation performed between the driver and the NIC of the host. Rather, Pandya's Figures 35, 37 and the supporting disclosure discuss a storage read flow (Figure 35 and supporting disclosure) and a storage write flow (Figure 37 and supporting disclosure) **between an initiator and a target**. The Applicant notes that an initiator and a target as described in Pandya is different from a driver and an NIC of a host. In addition to failing to disclose the initiation process between the driver and the NIC of a host, Pandya clearly cannot support a one-shot initiation process as least because Pandya discloses "[t]he initiation and target register the RDMA buffers **before** initiating the RDMA transfer...." (Pandya, Column 34, Lines 20-22). Similarly, Pandya further discloses "[t]he initiation and target **first** register their RDMA buffers with their RDMA controllers **and then** also advertise the buffers to their peer. **Then the initiation** issues a write command...." (Pandya, Column 34, Line 66 – Column 35, Line 2). Clearly, the multiple steps disclosed in Pandya fail to disclose a "one-shot initiation process," as set forth in Applicant's independent claim 1. Because the Office Action has failed to show "each and every element as set forth in the claim is found, either expressly or inherently described, in a single prior art reference" as required for an anticipation rejection under MPEP 2131, the rejections under 35 U.S.C. § 102(e) cannot be maintained.

With regard to claim 17, the non-final Office Action alleges that Pandya discloses "wherein a one-shot completion process of an RDMA operation is performed between the driver and the NIC of the host (Fig. 35 that shows a one-shot completion process 3507-3509 of an RDMA operation; column 34, lines 19-30 disclose the same details; Fig. 37 further shows the corresponding one-shot completion process 3710-3712 of an RDMA write operation; column 34, lines 65-67 thru column 35, lines 1-15 further disclose the details of the completion process for a write operation)." (Non-Final Office Action, Pages 5-6).

However, nothing in Pandya's Figures 35, 37 and the supporting disclosure discuss the completion process of an RDMA operation performed between the driver and the NIC of the host. Rather, Pandya's Figures 35, 37 and the supporting disclosure discuss a storage read flow (Figure 35 and supporting disclosure) and a storage write flow (Figure 37 and supporting disclosure) **between an initiator and a target**. The Applicant notes that an initiator and a target as described in Pandya is different from a driver and an NIC of a host. In addition to failing to disclose the completion process between the driver and the NIC of a host, the Applicant notes that Pandya does not explain steps 3507-3509 of Figure 35 and 3710-3712 of Figure 37 in the specification. Because the Office Action has failed to show "each and every element as set forth in the claim is found, either expressly or inherently described, in a single prior art reference" as required for an anticipation rejection under MPEP 2131, the rejections under 35 U.S.C. § 102(e) cannot be maintained.

Therefore, for at least the above stated reasons, Applicant respectfully submits that the Pandya reference fails to teach, suggest, or disclose Applicant's invention as set forth in claims 1 and 17. The Applicant believes that claims 1 and 17 are allowable over Pandya. Applicant respectfully submits that claims 1 and 17 are independent claims, and that claims 2-16 and 18-23 depend either directly or indirectly from independent claims 1 and 17, respectively. Because claims 2-16 and 18-23 depend from claims 1 and 17, respectively, Applicant respectfully submits that claims 2-16 and 18-23 are allowable over the Pandya reference, as well. The Applicant also submits that each of Applicant's claims 2-16 and 18-23 is independently allowable.

For example, with regard to Applicant's dependent claim 2, the non-final Office Action alleges that Pandya discloses "a system wherein the driver posts a single command message to perform the one-shot initiation process (Fig. 35 that shows a command request 3510 (SCSI Read with RDMA Buffer) after registering RDMA Buffers has been performed; (Fig. 37, command 3701 (SCSI Write using RDMA Read) shows another example of the driver posting a single command message to perform the one-shot initiation process for write operation; column 34, lines 19-30 and column 34, lines 65-67 thru column 35, lines 1-15 describe the details of the initiation process for read and write operations)." (Non-Final Office Action, Page 4). In addition

to failing to disclose the initiation process between the driver and the NIC of a host as discussed above with regard to Applicant's independent claim 1, Pandya clearly discloses multiple command messages 3501, 3510 in Figure 35. Similarly, in reference to Figure 37, Pandya further discloses "[t]he initiation and target **first** register their RDMA buffers with their RDMA controllers **and then** also advertise the buffers to their peer. **Then the initiation** issues a write command...." (Pandya, Column 34, Line 66 – Column 35, Line 2). Clearly, the multiple commands disclosed in Pandya fail to disclose a "wherein the driver posts a single command message to perform the one-shot initiation process," as set forth in Applicant's dependent claim 2. Because the Office Action has failed to show "each and every element as set forth in the claim is found, either expressly or inherently described, in a single prior art reference" as required for an anticipation rejection under MPEP 2131, the rejections under 35 U.S.C. § 102(e) cannot be maintained.

As another example, with regard to Applicant's dependent claim 3, the non-final Office Action alleges that Pandya "discloses a system wherein the single command message comprises a command to describe pinned-down memory buffers of the host (Fig. 35, Register RDMA Buffers command request 3501 that shows pinned-down memory buffers of the host; column 34, lines 19-30 disclose the same details)." (Non-Final Office Action, Page 4). The Applicant notes the inconsistency of the Office Action in its interpretation of "single command message" with regard to dependent claim 2 compared to dependent claim 3 (which depends from dependent claim 2). Specifically, the non-final Office Action first alleges with regard to dependent claim 2 that Pandya's command request **3510** is "wherein the driver posts a single command message to perform the one-shot initiation process," as set forth in Applicant's dependent claim 2. However, the non-final Office Action then alleges that command request **3501** discloses "wherein the single command message further comprises a command to describe pinned-down memory buffers of the host," as set forth in Applicant's dependent claim 3. The Applicant notes that command messages **3501** and **3510** are multiple command messages and therefore, cannot disclose "wherein the driver posts **a single command message** to perform the one-shot initiation process," as set forth in Applicant's dependent claim 2 and "wherein the **single command message further comprises** a command to describe pinned-down memory buffers of the host,"

as set forth in Applicant's dependent claim 3. Because the Office Action has failed to show "each and every element as set forth in the claim is found, either expressly or inherently described, in a single prior art reference" as required for an anticipation rejection under MPEP 2131, the rejections under 35 U.S.C. § 102(e) cannot be maintained.

The Applicant respectfully requests, therefore, that the rejection of claims 1-3 and 16-17 under U.S.C. §102(e), be withdrawn.

Rejections Under 35 U.S.C. §103(a) – Pandya in view of Tillier

Claims 4, 5, 10, 18, 20, 22 and 23 were rejected under 35 U.S.C. §103(a) as being unpatentable over Pandya in view of Tillier (U.S. Patent No. 6,421,742). The Applicant respectfully traverses the rejection for at least the following reasons. Claims 4, 5, 10, 18, 20, 22 and 23 depend from independent claims 1 or 17. Applicant believes that claims 1 and 17 are allowable over the proposed combination of references, in that Tillier fails to overcome the deficiencies of Pandya, for at least the reasons set forth above. Specifically, **nowhere in Tillier is there any disclosure with regard to initiation and completion processes between the driver and the NIC, let alone performing a one-shot initiation and completion process between the driver and the NIC of the host**. Rather, the only mention of a NIC in Tillier states that "a network interface controller (NIC) acts as the communications intermediary between the devices and the network and passes data blocks to and from the network in the speed and manner required by the network." (Tillier, Column 1, Lines 34-37). Acting as an intermediary between the devices and the network as disclosed in Tillier is different than performing a one-shot initiation (completion) process between the driver and the NIC of the host. Because claims 4, 5, 10, 18, 20, 22 and 23 depend from independent claims 1 or 17, Applicant respectfully submits that claims 4, 5, 10, 18, 20, 22 and 23 are allowable over the proposed combination of Pandya and Tillier, as well. The Applicant further submits that each of claims 4, 5, 10, 18, 20, 22 and 23 is independently allowable. Therefore, for at least the reasons set forth above, Applicant respectfully requests that the rejection of claims 4, 5, 10, 18, 20, 22 and 23 under 35 U.S.C.

§103(a) be withdrawn.

Rejections Under 35 U.S.C. §103(a)– Pandya in view of Tillier and further in view of Roach

Claims 6-9, 11-15 and 19 were rejected under 35 U.S.C. §103(a) as being unpatentable over Pandya in view of Tillier and further in view of Roach et al. (U.S. Patent No. 6,304,910, hereinafter "Roach"). The Applicant respectfully traverses the rejection for at least the following reasons. Applicant believes that claims 1 and 17 are allowable over the proposed combination of references, in that Roach fails to overcome the deficiencies of Pandya in view of Tillier, for at least the reasons set forth above. Because claims 6-9 and 11-15, and 19 depend, respectively, from independent claims 1 and 17, Applicant respectfully submits that claims 6-9, 11-15 and 19 are allowable over the proposed combination of Pandya, Tillier and Roach, as well. The Applicant further submits that each of claims 6-9, 11-15 and 19 is independently allowable. Therefore, for at least the reasons set forth above, Applicant respectfully requests that the rejection of claims 6-9, 11-15, 19, 24 and 25 under 35 U.S.C. §103(a) be withdrawn.

Rejections Under 35 U.S.C. §103(a) – Pandya in view of Roach

Claims 24 and 25 were rejected under 35 U.S.C. §103(a) as being unpatentable over Pandya in view of Roach. The Applicant respectfully traverses the rejection for at least the following reasons.

In order for a *prima facie* case of obviousness to be established, the Manual of Patent Examining Procedure, Rev. 6, Sep. 2007 ("MPEP") states the following:

> The key to supporting any rejection under 35 U.S.C. 103 is the clear articulation of the reason(s) why the claimed invention would have been obvious. The Supreme Court in KSR International Co. v. Teleflex Inc., 82 USPQ2d 1385, 1396 (2007) noted that the analysis supporting a rejection under 35 U.S.C. 103 should be made explicit. The Federal Circuit has stated that "rejections on obviousness

cannot be sustained with mere conclusory statements; instead, there must be some articulated reasoning with some rational underpinning to support the legal conclusion of obviousness."

See the MPEP at § 2142, citing *In re Kahn*, 441 F.3d 977, 988, 78 USPQ2d 1329, 1336 (Fed. Cir. 2006), and *KSR International Co. v. Teleflex Inc.*, 82 USPQ2d at 1396 (quoting Federal Circuit statement with approval). Further, MPEP § 2143.01 states that "the mere fact that references can be combined or modified does not render the resultant combination obvious unless the results would have been predictable to one of ordinary skill in the art" (citing *KSR International Co. v. Teleflex Inc.*, 82 USPQ2d 1385, 1396 (2007)). Additionally, if a *prima facie* case of obviousness is not established, the Applicant is under no obligation to submit evidence of nonobviousness:

> The examiner bears the initial burden of factually supporting any *prima facie* conclusion of obviousness. If the examiner does not produce a *prima facie* case, the applicant is under no obligation to submit evidence of nonobviousness.

See MPEP at § 2142.

Regarding claims 24 and 25, Applicant respectfully submits that the proposed combination of references fails to teach, suggest, or disclose at least, for example, "initiating an RDMA write operation using a one-shot initiation process between a driver and a NIC of a host," as set forth in Applicant's independent claim 24; and "completing an RDMA write operation using a one-shot completion process between a NIC and a driver of a host," as set forth in Applicant's independent claim 25.

The combination of Pandya and Roach is different than Applicant's independent claims 24 and 25 at least because Roach fails to remedy the deficiencies of Pandya. As discussed above with regard to Applicant's independent claims 1 and 17, Pandya's Figures 35, 37 and the supporting disclosure discuss a storage read flow (Figure 35 and supporting disclosure) and a storage write flow (Figure 37 and supporting disclosure) **between an initiator and a target**. The Applicant notes that an initiator and a target as described in Pandya is different from a driver and an NIC of a host. In addition to failing to disclose the initiation and completion processes between the driver and the NIC of a host, Pandya clearly cannot support a one-shot initiation

process as least because Pandya discloses "[t]he initiation and target register the RDMA buffers **before** initiating the RDMA transfer...." (Pandya, Column 34, Lines 20-22). Similarly, Pandya further discloses "[t]he initiation and target **first** register their RDMA buffers with their RDMA controllers **and then** also advertise the buffers to their peer. **Then the initiation** issues a write command...." (Pandya, Column 34, Line 66 – Column 35, Line 2). Clearly, the multiple steps disclosed in Pandya fail to disclose a "one-shot initiation process," as set forth in Applicant's independent claim 24.

Also, with regard to a "one-shot completion process," the Applicant notes that Pandya does not explain steps 3507-3509 of Figure 35 and 3710-3712 of Figure 37 in the specification. Roach discloses "[a] communication processor sends and receives frames of data and commands. Transmit and receive protocol engine is controlled by host driver software which utilizes predetermined bits to indicate which frame is the last frame in a series of frames. This information is then placed in the transmit frame before it is sent." (Roach, Abstract). Thus, the combination of Pandya and Roach clearly fail to disclose "initiating [completing] an RDMA write operation using a one-shot initiation [completion] process between a driver and a NIC of a host," as set forth in Applicant's independent claims 24 and 25.

Therefore, for at least the reasons set forth above, Applicant respectfully requests that the rejection of claims 24 and 25 under 35 U.S.C. §103(a) be withdrawn.

Rejections Under 35 U.S.C. §103(a)– Pandya in view of Tillier and further in view of Futral

Claim 21 was rejected under 35 U.S.C. §103(a) as being unpatentable over Pandya in view of Tillier and further in view of Futral et al. (U.S. Patent No. 5,991,797, hereinafter "Futral"). The Applicant respectfully traverses the rejection for at least the following reasons. Claim 21 depends from independent claim 17. Applicant believes that claim 17 is allowable over the proposed combination of references, in that Futral fails to overcome the deficiencies of Pandya and Tillier, for at least the reasons set forth above. Because claim 21 depends from

independent claim 17, Applicant respectfully submits that claim 21 is allowable over the proposed combination of Pandya, Tillier and Futral, as well. The Applicant further submits that claim 21 is independently allowable. Therefore, for at least the reasons set forth above, Applicant respectfully requests that the rejection of claim 21 under 35 U.S.C. §103(a) be withdrawn.

Final Matters

The Office Action makes various statements regarding former claims 1-25, 35 U.S.C. § 102(e), 35 U.S.C. § 103(a), the Pandya reference, the Tillier reference, the Roach reference, the Futral reference, one skilled in the art, etc. that are now moot in view of the previously presented amendments and/or arguments. Thus, the Applicants will not address all of such statements at the present time. However, the Applicants expressly reserve the right to challenge such statements in the future should the need arise (e.g., if such statements should become relevant by appearing in a rejection of any current or future claim).

Applicant reserves the right to argue additional reasons supporting the allowability of claims 1-25 should the need arise in the future.

CONCLUSION

Applicant respectfully submits that claims 1-25 are in condition for allowance, and requests that the application be passed to issue.

Should anything remain in order to place the present application in condition for allowance, the Examiner is kindly invited to contact the undersigned at the telephone number listed below.

Please charge any required fees not paid herewith or credit any overpayment to the Deposit Account of McAndrews, Held & Malloy, Ltd., Account No. 13-0017.

Date: _January 12, 2009_   Respectfully submitted,

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